

JAWORSKI, MARK

From: Heller, Donald <heller.donald@epa.gov>
Sent: Wednesday, April 29, 2015 9:47 AM
To: JAWORSKI, MARK
Subject: Allison transmission well logs
Attachments: MW-1003-S3.pdf; MW-1105-S3-4.pdf

With some assistance from GM, here are the logs.

MW-1003-S3 comes from "Supplement No. 2 to RCRA Facility Investigation: Vermont Street Investigation Data Report" May 2010

MW-1105-S3/4 comes from "Evaluation of Chlorinated Volatile Organic Compounds South of Allison Transmission Plant 12" August 17, 2011



ARCADIS

WELL CONSTRUCTION LOG

WELL NO.: **MW-1003-S3**

TOTAL DEPTH: **55.00**

PROJECT INFORMATION

PROJECT: **GM/ENCORE (Allison Transmission)**
 SITE LOCATION: **Speedway, IN**
 LOGGED BY: **Tim Porter**
 DATE STARTED: **4/8/2010**
 DATE COMPLETED: **4/14/2010**

DRILLING INFORMATION

DRILLING CO.: **WDC**
 DRILLER: **Tom Minor**
 DRILLING METHOD: **Sonic**
 COORDINATES:
 Northing: **1648812**
 Easting: **169308.4**
 TOC Elevation: **719.76**

DEPTH	SOIL SYMBOLS	SOIL DESCRIPTION	SAMPLE ID	SUDAN IV	PID (ppm)	WELL CONSTRUCTION DETAILS
0		CLAYEY SILT: Very dark grayish brown (10YR 3/2), ML, CLAYEY SILT with few sands, sl. moist, many roots, organic matter.	MW-1003-S3-01		0	Flush Mount PVC sch 40 bent-cement grout
			MW-1003-S3-02		0	
5		SANDY CLAY: Dark yellowish brown (10YR 4/4), SC, SANDY CLAY with silt, sl. moist, sl. plastic.	MW-1003-S3-03		0.3	
			MW-1003-S3-04		0	
		SAND: Dark yellowish brown (10YR 4/4), SM, silty clayey SAND, sl. moist, loose. 5.5 ft. - yellowish brown (10YR 5/4), SM, med-coarse sand, few-common gravels, trace cobbles, sl. moist-moist, loose.	MW-1003-S3-05		0	
10			MW-1003-S3-06		0	
			MW-1003-S3-07		0	
		SAND: (cont.) Increase in moisture (very moist-wet) from 6.0-7.0 ft. and 11.0-12.5 ft. 15.0-20.0 ft: wet, loose, SM-SP, med-coarse sands and gravels, few cobbles. 20.0-22.0 ft.: dry-sl. moist.	MW-1003-S3-08		0	
15			MW-1003-S3-09		0	
			MW-1003-S3-10		0	
		SILT: Yellowish brown (10YR 5/4), SM-ML, fine-sandy clayey SILT, wet, loose, few coarse sands, few gravels, soft. 24.2-24.5 ft.: increase in coarse sand and gravel content, stratified, sl. moist.	MW-1003-S3-11		0	
20			MW-1003-S3-12		0	
			MW-1003-S3-13		0	
		SAND: Brown (10YR 5/3), SM, fine-med SAND, few coarse sands, few gravels, wet, loose. 25.0-30.5 ft.: grain size increasing (SM-SP), wet, med-coarse sands and gravels. 29-30.5 ft.: color change to yellowish brown (10YR 5/6), wet, loose, many gravels, few cobbles	MW-1003-S3-14		0	
25			MW-1003-S3-15		0	
			MW-1003-S3-16		0	
		CLAYEY SILT: Yellowish brown (10YR 5/4), ML-CL, dense, sl. moist, few coarse sands, few gravels. 31.0-33.0 ft.: color change to gray (10Yr 5/1).	MW-1003-S3-17		0	
30			MW-1003-S3-18		0	
			MW-1003-S3-19		0	
		SAND: Yellowish brown (10YR 5/4), SM, fine-med SAND, few coarse sands, wet, loose. 37.0-38.0 ft.: grain size increase (med-coarse sands, common gravels), wet.	MW-1003-S3-20		0	
35			MW-1003-S3-21		0	
		CLAYEY SILT: Gray (10YR 5/1), ML-CL, dense, sl. moist, sl. soft, few coarse sands, few gravels, becoming more firm (less soft) with depth and less moist (dry).	MW-1003-S3-22		0	
40			MW-1003-S3-23		0	
			MW-1003-S3-24		0	
		SAND: Gray (10YR 5/1), SM, very fine-med SAND, few coarse sands, wet, loose. 47.0-48.0 ft.: grayish brown (10YR 5/2). 48.0-53.0 ft.: brown (10YR 5/3), med-coarse sands, common gravels.	MW-1003-S3-25		0	
45			MW-1003-S3-26		0	
			MW-1003-S3-27		0	
		CLAYEY SILT: Gray (10YR 5/1), ML-CL, dense, sl. moist, sl. soft, few coarse sands, few gravels. EOB @55.0 ft.	MW-1003-S3-28		0	
50					0	
55					0	

bentonite-chips

sand pack

PVC sch 40



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WELL CONSTRUCTION LOG

 WELL NO.: **MW-1105-S3/4**

 TOTAL DEPTH: **95.00**

PROJECT INFORMATION

PROJECT: **GM/ENCORE (Allison Transmission)**
 SITE LOCATION: **Speedway, IN**
 LOGGED BY: **Randall Woodruff and Tim Porter**
 DATE STARTED: **6/3/2011 12:30:00 PM**
 DATE COMPLETED: **6/6/2011**

DRILLING INFORMATION

DRILLING CO.: **WDC**
 DRILLER: **Russ Knotts**
 DRILLING METHOD: **Sonic**
 COORDINATES:
 Northing:
 Easting:
 TOC Elevation:

DEPTH	SOIL SYMBOLS	SOIL DESCRIPTION	SAMPLE ID	SUDAN IV	PID (ppm)	WELL CONSTRUCTION DETAILS
0		SILTY CLAY: ML-CL SILTY CLAY, common gravels, fine-medium sands, slightly moist, 10YR 4/4, Dark yellowish brown; grain size increasing at 2.5' to include medium-coarse sands, common-many gravels, few cobbles.	MW-1105-S3/4-01		0	Flush Mount-Concrete
			MW-1105-S3/4-02		0	PVC
			MW-1105-S3/4-03		0	grout
			MW-1105-S3/4-04		0.4	
		SILTY SAND: SM-ML SILTY SAND, common-many gravels, few cobbles, medium-coarse sand, 10YR 5/6, Yellowish brown.	MW-1105-S3/4-05		0.3	
			MW-1105-S3/4-06		0.6	
		CLAYEY SILT: ML-CL CLAYEY SILT Gray, moist, slightly plastic, few gravels, common medium-coarse sands, variegated pattern of 10YR 5/4 Yellowish brown and 10YR 5/1.	MW-1105-S3/4-07		1	
			MW-1105-S3/4-08		0.5	
		SAND: SM-SP medium-coarse SAND few-common gravels, slightly moist, 10YR 6/1 gray; very moist-wet at 13.5'; layer of fine sand from 13.5'-13.7' and 14.4'-14.8'.	MW-1105-S3/4-09		0	
			MW-1105-S3/4-10		0	
			MW-1105-S3/4-11		0	
		SAND: SM-SP medium-coarse SAND few-common gravels, color change to 10YR 5/4 Yellowish brown at 14.6'-17'; color change to 10YR 5/1 Gray from 17'-24.5'; loose and wet throughout this interval, fine sand from 17.2'-17.6' and 18.5'-20.5'.	MW-1105-S3/4-12		0	
			MW-1105-S3/4-13		0	
		CLAYEY SILT: ML CLAYEY SILT, few medium-coarse sands, trace gravels, dense, slightly moist, 10YR 5/1 Gray.	MW-1105-S3/4-14		0	
			MW-1105-S3/4-15		0	
			MW-1105-S3/4-16		0	
		SAND: SAND medium-coarse, common gravels, very moist, loose, 10YR 5/1 Gray; fine-medium sand from 28'-29'.	MW-1105-S3/4-17		0	
			MW-1105-S3/4-18		0	
		CLAYEY SILT: ML CLAYEY SILT, few medium-coarse sands, trace gravels, dense, slightly moist, 10YR 5/1 Gray; dry and hard at 35'.	MW-1105-S3/4-19		1.9	
			MW-1105-S3/4-20		2.8	
			MW-1105-S3/4-21		4.1	
		SILTY SAND: SM SILTY SAND, fine, few pebbles, few gravels, trace clays, slightly moist, 10YR 5/1 Gray; increasing moisture with depth; decrease in pebbles/gravels with depth.	MW-1105-S3/4-22		3.6	
			MW-1105-S3/4-23		4	
			MW-1105-S3/4-24		1.2	
		SILTY CLAY: ML-CL SILTY CLAY (till), few gravels, trace pebbles, trace medium sands, hard, slightly plastic, 10YR 5/1 Gray; sand lens from 47'-47.5', medium-coarse, slightly moist-moist gravels.	MW-1105-S3/4-25		0.8	
			MW-1105-S3/4-26		2	



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 DRILLER: **Russ Knotts**
 DRILLING METHOD: **Sonic**
 COORDINATES:
 Northing:
 Easting:
 TOC Elevation:

DEPTH	SOIL SYMBOLS	SOIL DESCRIPTION	SAMPLE ID	SUDAN IV	PID (ppm)	WELL CONSTRUCTION DETAILS
55			MW-1105-S3/4-27		1.7	
			MW-1105-S3/4-28		0.4	
			MW-1105-S3/4-29		0	
			MW-1105-S3/4-30		0	
			MW-1105-S3/4-31		0	
			MW-1105-S3/4-32		0	
			MW-1105-S3/4-33		0	
			MW-1105-S3/4-34		0	bentonite-pellets
			MW-1105-S3/4-35		0	
			MW-1105-S3/4-36		0	sand pack
			MW-1105-S3/4-37		0	PVC sch 40
		SILTY SAND: Clayey SILTY SAND, wet, moist, soft, sticky, 10YR 5/1 Grey.	MW-1105-S3/4-38		3	
		SILTY CLAY: ML-CL SILTY CLAY (till), pebbles, hard, non-plastic, 10YR 5/1 Grey; sand lens from 80'-80.25, fine, grey, slightly moist; sand lens from 88'-89.25, medium-coarse, slightly moist, silt and clay, gravels. End of boring at 95.0.	MW-1105-S3/4-39		0	
			MW-1105-S3/4-40		0	
			MW-1105-S3/4-41		0	bentonite-pellets
			MW-1105-S3/4-42		0	
			MW-1105-S3/4-43		0	
			MW-1105-S3/4-44		0	
			MW-1105-S3/4-45		0	
			MW-1105-S3/4-46		0	
			MW-1105-S3/4-47		0	
			MW-1105-S3/4-48		0	